Test Report
Consistency test

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Mix Type	Plain Cement Concrete (1:4:8)
Contractor	Sri A.Sathish Gowda
Test Method	IS : 4031 (Part 5) -1988 & Specification for Road & Bridge Works, MORT&H, Rev-V.
Location	At Site
Material	Cement
Sample No	1
Date	3-Apr-2019

Sl. No.	Description	Trial 1	Trial 2	Trial 3	Trial 4	Trial 4
1	Weight of Cement	400	400	400	400	400
2	Percentage of water added (%)	27	28.5	29.5	30	31
3	Weight of Water (gm)	108	114	118	120	124
4	Initial Reading of Plunger (mm)	40	40	40	40	40
5	Difference (mm)	21.5	17	12	6.9	5.6

Results: Standard Consistency of Cement: 31.00%

Note:

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Asst. Executive Engineer
Project Division
Yelahanka Zone
Bangalore

Test Report
Fineness test

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Mix Type	Plain Cement Concrete (1:4:8)
Contractor	Sri.A.Sathish Gowda
Test Method	IS : 4031 (Part 5) -1988 & Specification for Road & Bridge Works, MORT&H, Rev-V.
Location	At site
Material	Cement
Sample No	1
Date	3-Apr-2019

Sl. No.	Determination	Trial 1	Trial 2
1	Weight of Cement before sieve (gm)	100	100
2	Weight of residue retained on 90um sieve (gm)	3.4	3.2
3	Percentage retained (%)	3.4	3.2
4	Average Percentage retained (%)	3.3	

Results: Residue of cement is: 3.3%

Comments: Maximum allowable residue by mass for ordinary portlad cement is 10%

Note:

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Project Division
Yelahanka Zone
Bangalore

Test Report
Soundness test

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Mix Type	Plain Cement Concrete (1:4:8)
Contractor	Sri A.Sathish Gowda
Test Method	IS : 4031 (Part 3) -1988 & Specification for Road & Bridge Works, MORT&H, Rev-V.
Location	At Site
Material	Cement
Sample No	1
Date	3-Apr-2019

Sl. No.	Description	Trial 1	Trial 2	Trial 3
1	Initial Distance between the indicator points of Lechatelier mould	11	10	11
2	Final Distance between the indicator points of Lechatelier mould	14	15	15
3	Difference or expansion	3	5	4
4	Average Differences or Expansion in mm	4.00		

Results: Difference in Expansion of Cement: 4.00mm

Comments: Maximum allowable Expansion of cement is 10mm.

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Asst. Executive Engineer
Project Division
Yelahanka Zone
Bangalore

Test Report
Compressive strength test

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Mix Type	Plain Cement Concrete (1:4:8)
Contractor	Sri A.Sathish Gowda
Test Method	IS : 4031 (part 6)-1988 & Specification for Road & Bridge Works, MORT&H, Rev. V.
Location	At Site
Material	Cement
Sample No	1
Date	10-Apr-2019

Cube	Cement Grade	Age at Test (Days)	Slump (mm)	Weight (kg)	Dimension (LxWxH)	Density (kg/m3)	Max. Load (KN)	Area (mm2)	Compressive Strength (N/mm2)	Average Sample (n/mm2)
1	43	7	-	0.84	70.6x70.6 x70.6	2387.1	185	4984.36	37.12	37.32
2	43	7	-	0.85	70.6x70.6 x70.6	2415.5	187	4984.36	37.52	

Results: 7-days Compressive strength of cement is 37.32N/mm^2

Comments: 7-days Compressive strength of cement should not be less than 33 N/mm^2

Note:

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Asst. Executive Engineer
Project Division
Yelahanka Zone
Bangalore

Test Report
Compressive strength test

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Mix Type	Plain Cement Concrete (1:4:8)
Contractor	Sri A.Sathish Gowda
Test Method	IS : 4031 (part 6)-1988 & Specification for Road & Bridge Works, MORT&H, Rev. V.
Location	At Site
Material	Cement
Sample No	1
Date	1-May-2019

Cube	Cement Grade	Age at Test (Days)	Slump (mm)	Weight (kg)	Dimension (LxWxH)	Density (kg/m3)	Max. Load (KN)	Area (mm2)	Compressive Strength (N/mm2)	Average Sample (n/mm2)
1	43	28	-	0.82	70.6x70.6 x70.6	2287.0	226	4984.36	45.34	46.14
2	43	28	-	0.85	70.6x70.6 x70.6	2316	234	4984.36	46.95	

Results: 28-days Compressive strength of cement is 46.14N/mm^2

Comments: 28-days Compressive strength of cement should not be less than 43 N/mm^2

Note:

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Asst. Executive Engineer
Project Division
Yelahanka Zone
Bangalore

Test Report
Gradation test

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Mix Type	Plain Cement Concrete (1:4:8)
Contractor	Sri A.Sathish Gowda
Test Method	IS : 2386 (Part - 1) 1963 & Specification for Road & Bridge Works, MORT&H, Rev. V.
Location	At site
Material	Fine Aggregates
Sample No	1
Date	3-Apr-2019

Weight of Sample(gram): 200

Sl No.	IS Sieve Size	Weight retained	% retained	% Cumulative	Cumulative % of Passing		Remarks
					% Passing	Gradation limits	
1	10 mm	0	0.00	0.00	100.00	100	Gradation satisfies the MORT&H Zone ll Specification for PQC
2	4.75 mm	12	6.00	6.00	94.00	90-100	
3	2.36 mm	22	11.00	17.00	83.00	75-100	
4	1.18 mm	12	6.00	23.00	77.00	55-90	
5	600 µ	44	22.00	45.00	55.00	35-59	
6	300 µ	63	31.50	76.50	23.50	8-30	
7	150 µ	34	17.00	93.50	6.50	0-10	

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Asst. Executive Engineer
Project Division
Yelahanka Zone
Bangalore

Test Report
Gradation test

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Mix Type	Plain Cement Concrete (1:4:8)
Contractor	Sri A.Sathish Gowda
Test Method	IS : 2386 (Part - 1) 1963 & Specification for Road & Bridge Works, MORT&H, Rev. V.
Location	At site
Material	Coarse aggregates
Sample No	1
Date	3-Apr-2019

Weight of Sample: 4000 gms

Sl. No	I.S. Sieve size	Weight Retained (gm)	of weight Retained (%)	ive Percentage of	Passing		Remarks
					Test Result	Gradation Limits as per	
1	31.50	0	0.00	0.00	100.00	100	
2	26.50	495	12.38	12.38	87.63	85-95	
3	19.00	325	8.13	20.50	79.50	68-88	
4	9.50	633	15.83	36.33	63.68	45-65	
5	4.75	421	10.53	46.85	53.15	30-55	
6	0.60	954	23.85	70.70	29.30	8-30	
7	0.15	850	21.25	91.95	8.05	5-15	
8	0.08	254	6.35	98.30	1.70	0-5	

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Asst. Executive Engineer
Project Division
Yelahanka Zone
Bangalore

Test Report
Water absorption test

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Mix Type	Plain Cement Concrete (1:4:8)
Contractor	Sri A.Sathish Gowda
Test Method	IS : 2386 (Part - 3) 1963 & Specification for Road & Bridge Works, MORT&H, Rev. V.
Location	At site
Material	Coarse aggregates
Sample No	1
Date	3-Apr-2019

Sl. No.	Particulars	Computations	Test Numbers		Mean
			Test 1	Test 2	
1	Weight of SSD sample	W_1 g	761	763	
2	Aggregates Immersed in water	W_2g	2025	2030	
3	Aggregate in water	W_sg = W_2- W_1	1264	1267	
4	dry aggregate in Air	W_3 g	2060	2055	
5	Volume of the Aggregate	W_3- W_s	796	788	
6	Aggregate	W_4g	2021	2026	
7	Specific Gravity	W_4/(W_3- W_s)	2.54	2.57	2.56
8	Apparent Specific Gravity	W_4/(W_4- W_s)	2.67	2.67	2.67
9	Water Absorption	(W_4- W_3)*100/ W_4	1.93	1.43	1.68

Comments: Maximum allowable Aggregate Water Absorption value is 2.0%.

Note:

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Asst. Executive Engineer
Project Division
Yelahanka Zone
Bangalore

Test Report
Impact test

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Mix Type	Plain Cement Concrete (1:4:8)
Contractor	Sri A.Sathish Gowda
Test Method	IS : 2386 (Part - 4) 1963 & Specification for Road & Bridge Works, MORT&H, Rev. V.
Location	At Site
Material	Coarse aggregates
Sample No	1
Date	3-Apr-2019

Sl. No.	Determination	Unit	Trails	
1	Weight of empty cylinder, w1	gm	960	960
2	Weight of container filled with Aggregate, w2	gm	1303	1305
3	Weight of the Aggregate before compaction, (w2 - w1) = w3	gm	343	345
4	Weight of the sample passing through 2.36 mm IS sieves after Impact, w4	gm	81	79
5	Weight of the sample retained on 2.36 mm IS sieve after Impact, w5	gm	262	266
6	Aggregate Impact Value (w4 / w3)x100	%	23.62	22.90
7	Specified Limit	%	45.00	

Results: Average Aggregate Impact Value: **23.26** %

Note:

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Asst. Executive Engineer
Project Division
Yelahanka Zone
Bangalore

Test Report
Concrete Compresive strength

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Mix Type	Concrete(M15)
Contractor	Sri A.Sathish Gowda
Test Method	IS : 4031 (part 6)-1988 & Specification for Road & Bridge Works, MORT&H, Rev. V.
Location	Bay
Material	Concrete
Sample No	1
Date	15-May-2019

Cube	Concrete Grade	Age at Test (Days)	Weight (kg)	Dimension (LxWxH)	Density (kg/m^3)	Max. Load (KN)	Area (m^2)	Compressive Strength (N/mm^2)	Avg. Sample Strength	Avg. Strength
1	15	7	7.09	150*150*150	2100.74	262.00	0.0225	11.64	12.21	12.21
2	15	7	7.11	150*150*150	2106.67	282.00	0.0225	12.53		
3	15	7	7.00	150*150*150	2074.07	280.00	0.0225	12.44		
4	15	7	7.29	150*150*150	2160.00	264.00	0.0225	11.73	12.22	
5	15	7	7.11	150*150*150	2106.67	275.00	0.0225	12.22		
6	15	7	7.13	150*150*150	2112.59	286.00	0.0225	12.71		

Results: 7-days Compressive strength of cement is 12.21 N/mm2

Note:

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For Mecadez Core Technologies Private Limited

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Asst. Executive Engineer
Project Division
Yelahanka Zone
Bangalore

Test Report
Concrete Compresive strength

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Mix Type	Concrete(M15)
Contractor	Sri A.Sathish Gowda
Test Method	IS : 4031 (part 6)-1988 & Specification for Road & Bridge Works, MORT&H, Rev. V.
Location	Bay
Material	Concrete
Sample No	2
Date	15-May-2019

Cube	Concrete Grade	Age at Test (Days)	Weight (kg)	Dimension (LxWxH)	Density (kg/m^3)	Max. Load (KN)	Area (m^2)	Compressive Strength (N/mm^2)	Avg. Sample Strength	Avg. Strength
1	15	7	7.18	150*150*150	2127.41	264.00	0.0225	11.73	12.30	12.30
2	15	7	7.20	150*150*150	2133.33	284.00	0.0225	12.62		
3	15	7	7.09	150*150*150	2100.74	282.00	0.0225	12.53		
4	15	7	7.38	150*150*150	2186.67	266.00	0.0225	11.82	12.31	
5	15	7	7.20	150*150*150	2133.33	277.00	0.0225	12.31		
6	15	7	7.22	150*150*150	2139.26	288.00	0.0225	12.80		

Results: 7-days Compressive strength of cement is 12.30 N/mm2

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Asst. Executive Engineer
Project Division
Yelahanka Zone
Bangalore

Test Report
Concrete Compresive strength

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Mix Type	Concrete(M15)
Contractor	Sri A.Sathish Gowda
Test Method	IS : 4031 (part 6)-1988 & Specification for Road & Bridge Works, MORT&H, Rev. V.
Location	Bay
Material	Concrete
Sample No	1
Date	5-Jun-2019

Cube	Concrete Grade	Age at Test (Days)	Weight (kg)	Dimension (LxWxH)	Density (kg/m^3)	Max. Load (KN)	Area (m^2)	Compressive Strength (N/mm^2)	Avg. Sample Strength	Avg. Strength
1	15	28	8.39	150*150*150	2485.93	436.00	0.0225	19.38	19.87	20.09
2	15	28	8.30	150*150*150	2459.26	445.00	0.0225	19.78		
3	15	28	8.18	150*150*150	2423.70	460.00	0.0225	20.44		
4	15	28	8.43	150*150*150	2497.78	472.00	0.0225	20.98	20.31	
5	15	28	8.38	150*150*150	2482.96	452.00	0.0225	20.09		
6	15	28	8.39	150*150*150	2485.93	447.00	0.0225	19.87		

Results: 28-days Compressive strength of cement is 20.09 N/mm2

Note:

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Asst. Executive Engineer
Project Division
Yelahanka Zone
Bangalore

Test Report
Concrete Compresive strength

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Mix Type	Concrete(M15)
Contractor	Sri A.Sathish Gowda
Test Method	IS : 4031 (part 6)-1988 & Specification for Road & Bridge Works, MORT&H, Rev. V.
Location	Bay
Material	Concrete
Sample No	2
Date	5-Jun-2019

Cube	Concrete Grade	Age at Test (Days)	Weight (kg)	Dimension (LxWxH)	Density (kg/m^3)	Max. Load (KN)	Area (m^2)	Compressive Strength (N/mm^2)	Avg. Sample Strength	Avg. Strength
1	15	28	8.48	150*150*150	2512.59	438.00	0.0225	19.47	19.96	20.18
2	15	28	8.39	150*150*150	2485.93	447.00	0.0225	19.87		
3	15	28	8.27	150*150*150	2450.37	462.00	0.0225	20.53		
4	15	28	8.52	150*150*150	2524.44	474.00	0.0225	21.07	20.40	
5	15	28	8.47	150*150*150	2509.63	454.00	0.0225	20.18		
6	15	28	8.48	150*150*150	2512.59	449.00	0.0225	19.96		

Results: 28-days Compressive strength of cement is 20.18 N/mm2

Note:

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Asst. Executive Engineer
Project Division
Yelahanka Zone
Bangalore

Test Report
Kerb stone

Project Name	Providing Children Play Equipments and Senior Citizen Gym Equipments and Landscape Development to Parks in Ward no. 07, Byadrayanapura of Yelahanka Zone
Client	Project Division Yelahanka ZONE
Job No	MCTPL/BBMP/EE/YNK/PMC/W-7/2018-2019/QR/2
Contractor	Sri A.Sathish Gowda
Location	Bay
Material	Kerb stone
Sample No	1
Date	8-Apr-2019

SL.NO	Failure Load in KN	CHARACTERISTIC COMPRESSIVE STRENGTH, fck , in, N/Sq.mm	AVG CHARACTERISTIC COMPRESSIVE STRENGTH, fck in N/Sq.mm	REMARKS
1	488	16.6	16.67	
2	484	16.8		
3	483	16.6		

Results: Compressive strength of kerb stone is 16.67 N/mm2

Note:

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